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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/732,185	12/08/2000	Donald L. Schilling	GBTI94US	6859

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MCDERMOT, WILL & EMERY
600 13TH STREET, NW
WASHINGTON, DC 20005-3096

EXAMINER

NGUYEN, STEVEN H D

ART UNIT	PAPER NUMBER
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2665

DATE MAILED: 03/22/2004

26

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/732,185

Applicant(s)

SCHILLING, DONALD L.

Examiner

Steven HD Nguyen

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 12 January 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☐ Claim(s) _____ is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☐ Claim(s) _____ is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Objections

1. Claim 37 is objected to because of the following informalities: "27, 31 or 3" should be changed to - 27, 31 or 32 --. Appropriate correction is required.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).
4. Claims 16, 20-27, 31-38 and 42-50 are rejected under 35 U.S.C. 103(a) as being unpatentable over Schilling (USP 5166951) in view of Kato (USP 5793794).

Regarding claims 16, 20-27, 31-38 and 42-50, Schilling discloses a communication system which a packet transmitter including a demultiplexer (Fig 2, Ref 99) for demultiplexing the encoded data into a plurality of sub data sequences from a buffer for intended receiver (Fig 5,

Ref 405), spreading-spectrum means for spread-spectrum processing each of the sub data sequence signals by respective chip sequence signal, thereby generating a plurality of spread-spectrum channels, with a respective chip sequence signal different from a each chip sequence signal in a plurality of chip sequence signals for spread-spectrum processing the plurality of sub data sequence signals, respectively, and with the plurality of chip sequence signals commonly used by the plurality of packet transmitters (Fig 5, Ref 407-408); combiner means for algebraically combining the plurality of spread spectrum channels as a multichannel spread spectrum signal (Fig 2, Ref 105), transmitter means for transmitting at a carrier frequency the packet-spread-spectrum signal using radio waves over a communications channel (Col 19, lines 12-16) and memory means for storing the data is well known in the art (see col. 7, lines 43-47). However, Schilling fails to disclose a header means concatenated with a spread spectrum signal wherein the header including a header symbol sequence signal comprising a predefined sequence of symbols spread spectrum processed with a chip sequence signal. In the same field of endeavor, Kato discloses (Fig 20) a serial/parallel (Fig 20, Ref 3105) for distributing the transmission data onto each of plurality of channels and spreading the transmission data with PN code which is generated by code generation (Fig 20, Ref 3101 which generates a plurality of PN codes wherein PN0 is used for spreading the preamble pattern "predefined sequence of symbols" and PN1- PNn used to spread the data transmission); header device (Fig 20, Ref 3106, 3109, 3104 and 3103101) for adding header to a spread spectrum data signal wherein the header including a header symbol sequence signal comprising a predefined sequence of symbols spread spectrum processed with a chip sequence signal for transmitting to a receiver (the transmitter which transmits a preamble "header" is a predefined of sequence symbols spread spectrum

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processed by a PN code, synchronizing with receiver; wherein the preamble comprising a predefined sequence of symbols spread spectrum processed by a chip sequence transmitted in front of the spread spectrum channels; col. 12 lines 13-34, preamble pattern is all '1' or '0' and '1'; see col. 2, lines 32-46, Fig 20, Ref 3104 and 3102 are used to concatenate the spread spectrum preamble with spread spectrum data to form a multi spread spectrum channels for transmitting to the receiver).

Since, Schilling discloses a PN code that adds with a multiple spread spectrum channel. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to apply the teaching of generating a preamble "header" comprising synchronization such PN0 in front of plurality of spread spectrum channels wherein the preamble "header" comprising a predefined sequence of symbols spread spectrum processed by a chip sequence as taught by Kato's transmitter into the packet multiplexing system of Schilling in order to add the controlling information into the packet to provide a timing and controlling data to receiver, thereby, enhancing the system with higher efficiency.

5. Claims 17-19, 28-30 and 39-41 are rejected under 35 U.S.C. 103(a) as being unpatentable over Schilling '951 and Kato and as applied to claims 16, 27 and 38 above, and further in view of Schilling (USP 5260967) and Kim (USP 5619526).

Regarding claims 17-19, 28-30 and 39-41, Schilling '951 and Kato fail to fully disclose the claimed invention. However, the examiner takes official notice that encoder means for encoding, scrambling or encrypting is well known and expected in the art as disclosed by Schilling '967 which used an encrypt for encrypting the encoded information before transmitting

(Fig 1, Ref 52) and Kim which used a scrambler for scrambling the encoded information before transmitting (Fig 1, Ref 103 and 101).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to apply an encoder having the function as encryption, scramble as disclosed by Kim and Schilling '967 into the system of Kato and Schilling in order to provide security for transmitting data.

Conclusion

6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Steven HD Nguyen whose telephone number is (703) 308-8848. The examiner can normally be reached on 8-5.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Huy D Vu can be reached on (703) 308-6602. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 305-4700.



Steven HD Nguyen
Primary Examiner
Art Unit 2665
3/12/04